

ABSTRACT OF THE DISCLOSURE
DETECTION APPARATUS, LITHOGRAPHY APPARATUS, AND ARTICLE
MANUFACTURING METHOD

A detection apparatus for detecting a surface position of a detection surface includes a mask with slits, a projection optical system configured to form an image on the detection surface by irradiating the detection surface with light having passed through the slits, an image sensor, and a light-receiving optical system configured to form, on the image sensor, an image of light reflected from the detection surface, wherein $\beta_1 = \tan\theta_2/\tan\theta_1$, $70^\circ < \theta_1 < 85^\circ$, $\theta_2 < 70^\circ$, and $0.03 < \beta_1 < 0.40$ are satisfied, where θ_1 represents an incident angle of the light to the detection surface, θ_2 represents an incident angle of the light to the image sensor, and β_1 represents an optical magnification of the light-receiving optical system.

(Fig. 1)